

SHOOTING STAR

February – April

Dodecatheon hendersonii

Primrose Family

Lavender, white or magenta petals bend sharply backward towards a maroon, leafless stem. Dodecatheon means “12 gods,” in reference to the 12 ancient Greek gods living atop Mt. Olympus. The way the flowers hang close to each other was likened to a meeting of these deities.

Ethnobotanic Uses:

American Indians cooked and ate shooting star roots and leaves. Flowers served as women’s dance ornaments and were hung on cradles to make babies sleepy.

BLUE DICKS

February – May

Dichelostemma capitatum ssp. Capitatum

Lily Family

Purple flowers top stems up to two feet high. Below ground, corms – the bulb-like base of the stem – nourish mule deer and black bears. Corms can wait underground for more than a decade before sprouting.

Ethnobotanic Uses:

Corms provided an important source of starch for American Indians. Blue dicks are also mentioned in storytelling.

MINER’S LETTUCE

February – May

Claytonia perfoliata ssp. Perfoliata

Purslane Family

The saucer-shaped leaves of this winter annual served as an important source of Vitamin C for miners during the Gold Rush, hence its name. Look for this plant in cool, wet areas.

Ethnobotanic Uses:

American Indians ate the seeds and leaves.

CALIFORNIA BLACK OAK

May – June

Quercus kelloggii

Oak Family

Look for bright green, six-lobed leaves ending in pointed “teeth.” The largest mountain oak in the West, California black oak ranges from Baja, California to southwestern Oregon.

Ethnobotanic Uses:

California black oak was used for food, medicine, dyes, utensils, games, toys, and construction materials. Young sprouts in particular were fashioned into a wide range of items. Tribal peoples still gather acorns today.



© Keir Morse

CALIFORNIA BLACK OAK



© Neil Kramer

BLUE DICKS



© Chris Wagner

MINER'S LETTUCE



© Keir Morse

SHOOTING STAR

CALIFORNIA BUTTERCUP

March – August

Ranunculus californicus

Buttercup Family

Ranunculus is Latin for “little frog,” from California buttercup’s preference for wet habitats. This plant displays waxy yellow flowers among wedge-shaped, hairy leaves.

Ethnobotanic Uses:

The Miwok dried and stored seeds, using them for food. Its flowers can be used to make dyes.

OAK spp.

Quercus spp.

Oak Family

Nearly 500 species of oaks exist worldwide. The Latin name for oaks, “quercus,” is said to come from the Celtic for “fine” and “tree.”

Ethnobotanic Uses:

Acorns were a staple of native peoples’ diets. The Chumash smeared chewed acorn pulp on their skin to help prevent sunburn and rubbed raw acorn meal into their hair to stimulate growth after trimming. The Chumash used acorns as religious offerings throughout the year, including at the winter solstice.

CALIFORNIA BUCKEYE

May – June

Aesculus californica

Buckeye Family

California buckeye seeds are poisonous unless subjected to a lengthy detoxification process. Squirrels are the only wildlife that eats its seeds. The whitish-pink flowers are poisonous to honeybees.

Ethnobotanic Uses:

The Sierra Miwok, Northern Maidu and other tribes treated snakebites using a poultice made from the bark at the base of the tree. The Pomo fashioned buckeye shoots into spindles or twirling sticks for fire-making kits. Crushed nuts acted as a fish poison.

YARROW

June – September

Achillea millefolium

Sunflower Family

Yarrow, related to chrysanthemums and chamomile, reveals its fan of white blooms in sunny meadows. Yarrow’s scientific name pays tribute to Achilles of Greek mythology, who applied this plant to wounded soldiers to help stop bleeding.

Ethnobotanic Uses:

Yarrow was mashed into a poultice to staunch bleeding and treat sores and cuts. The Spanish name for yarrow, “muela,” means “molar tooth,” as yarrow was used to treat toothaches.



CALIFORNIA BUCKEYE



YARROW



CALIFORNIA BUTTERCUP



OAK SPP.

© Nick Shaforstoff

© Keir Morse

© Neal Kramer

© Christopher L. Christie

ELEGANT CLARKIA

May – June

Clarkia unguiculata

Primrose Family

Also called “Farewell to Spring,” elegant clarkia is named for William Clark of the Lewis and Clark expedition. Four pink, paddle-like petals frame long, red stamens in this easily recognizable flower.

Ethnobotanic Uses:

American Indians ate the seeds with acorn mush.

GREY MULE EARS

March – May

Wyethia helenioides

Sunflower Family

Grey mule ears cover California hillsides with yellow blooms. Its leaves grow vertically to help retain moisture.

Ethnobotanic Uses:

The Miwok used its green leaves as a top layer to cover hot stones in earthen ovens.

CALIFORNIA POPPY

March – May

Eschscholzia californica

Poppy Family

The official state flower of California, this golden bloom is celebrated yearly on April 6, designated as California Poppy Day. Its petals open only on sunny days.

Ethnobotanic Uses:

The roots helped soothe toothaches, headaches and stomachaches. The Ohlone rubbed flowers into their hair to kill lice. California poppy also appears in Chumash beliefs and myths.

VALLEY OAK

Quercus lobata

Oak Family

Native to California, valley oak features deeply lobed leaves and slender acorns that taper to a sharp point. Rounded galls attached to its branches are homes for the larvae of the wasp *Andricus californicus*.

Ethnobotanic Uses:

The Chumash ate valley oak acorns while the Spanish fashioned wagon axles from its wood.



VALLEY OAK



CALIFORNIA POPPY



GREY MULE EARS



ELEGANT CLARKIA

MAIDENHAIR FERN

Adiantum jordanii

Fern Family

Look for the rounded, ginkgo-like fronds of this native California fern in shady areas. Maidenhair fern is a carrier of Sudden Oak Death, a disease harmful to oaks and other plants.

Ethnobotanic Uses:

The Chumash drank maidenhair fern tea during difficult childbirths, to stop hemorrhages, and to induce menstruation. The Ohlone used it to ease stomach troubles and as a blood purifier.

STICKEY MONKEY FLOWER

March – August

Mimulus aurantiacus

Figwort Family

True to its name, this plant has a sticky stem. Flowers bloom orange, red or white and attract hummingbirds and bees. Sticky monkey flower is a host plant for the checkerspot butterfly.

Ethnobotanic Uses:

Sticky monkey flower leaves were used to treat stomachaches and kidney and bladder issues. The Pomo mixed its flowers with water to create an eyewash.

CALIFORNIA BAY

March – May

Umbellularia californica

Laurel Family

Crush the leaves of the California bay laurel to release a strong smell. The scent comes from camphor-like oil that has medicinal qualities. Dried rosemary contains camphor, and both rosemary and bay leaves are used in cooking.

Ethnobotanic Uses:

Laurel leaf tea treated colds, stomachaches and sore throats. American Indians ate the olive-like fruit and ground it into meal for cakes. Chumash hunters burned its leaves to help attract and stupefy deer.

COMMON TARWEED

June – August

Madia elegans ssp. densifolia

Sunflower Family

Tarweed's name originates from its powerful, unpleasant odor. Yellow blooms grace stems up to four feet tall.

Ethnobotanic Uses:

Bunches of tarweed tied to a stick formed a broom used to sweep outside Spanish missions. The Pomo used its seeds to make pinole, a mixture of ground seeds and herbs.



© Neal Kramer

COMMON TARWEED



© Aaron Arthur

CALIFORNIA BAY



© Leah Duran

STICKY MONKEY FLOWER



© Steve Matson

MAIDENHAIR FERN

COMMON MADIA

June – September

Madia elegans

Sunflower Family

Yellow blooms ring centers colored from lemon to maroon. The flowers stay open from late afternoon until mid-morning.

Ethnobotanic Uses:

American Indians used its seeds to make pinole and flour. The Shoshoni mixed its roasted seeds with acorns, manzanita berries and pine nuts.

COYOTE BRUSH

September – January

Baccharis pilularis

Sunflower Family

More than 50 species of insects pollinate the yellow-white flowers of this evergreen shrub. Coyote brush is named for Bacchus, the Roman god of wine and plants.

Ethnobotanic Uses:

Leaves of coyote brush provided relief from poison oak rash. Its branchlets were used to brush away the spines of prickly-pear cactus as they were collected.

COMMON FIDDLENECK

March – May

Amsinckia menziesii var. *intermedia*

Borage Family

Honeybees and butterflies flock to the yellow-orange flowers of this California annual. The slender flowers echo the shape of a fiddle's neck.

Ethnobotanic Uses:

The Chumash ate ground and toasted fiddleneck seeds in a pinole.

TOYON

June – August

Heteromeles arbutifolia

Rose Family

The bright red clusters of toyon, also known as Christmas berry, often decorated California houses during the holidays in place of English holly. Hollywood is possibly named for toyon, found in its surrounding foothills.

Ethnobotanic Uses:

Toyon berries were eaten after being toasted over coals or dried in the hot sun. From the hard wood, American Indians created bowls, cups, flutes, cradle frames, canoe pegs, hide scrapers, and salmon spears. Toyon was used in ceremonial activities, including for dance regalia and offertory poles.



COMMON FIDDLENECK



COMMON MADIA

TOYON

COYOTE BRUSH

© Thomas Stoughton

© Keir Morse

© Neal Kramer

© Christopher L. Christie

CALIFORNIA WOOD FERN

Dryopteris arguta

Fern Family

Also known as coastal wood fern, this fern grows in oak woodlands and on shady slopes from sea level to 6,000 feet elevation.

Ethnobotanic Uses:

The roots, boiled into a tea, were drank and used as a wash to treat injuries resulting from falls or blows. The Ohlone ate the rhizomes and steeped the fronds in water to create a hair wash.

CALIFORNIA SAGEBRUSH

April – October

Artemisia californica

Sunflower Family

Also called coastal sagebrush, this shrub grows up to 5 feet tall and displays tiny, yellow-brown flowers. Touch its leaves to release a strong aroma caused by organic compounds called terpenes, also responsible for the scent and flavor of hops.

Ethnobotanic Uses:

California sagebrush leaves were used to treat headaches, paralysis, and poison oak reactions. Leaves were sometimes smoked for recreational purposes. The Chumash burned the plant as cooking fuel and created sagebrush windbreaks and brush barricades around dance grounds.

BLUE OAK

March – May

Quercus douglasii

Oak Family

Blue oak is named for the bluish-green color of its wavy, 1-3-inch long leaves. The hue becomes more noticeable during periods of drought.

Ethnobotanic Uses:

The Midoo chewed blue oak leaves to ease sore throats, while the Kawaiisu applied a poultice to sores and cuts. Bowls were constructed out of blue oak burls, while other parts were used to make utensils and baskets.

COMMON MANZANITA

January – March

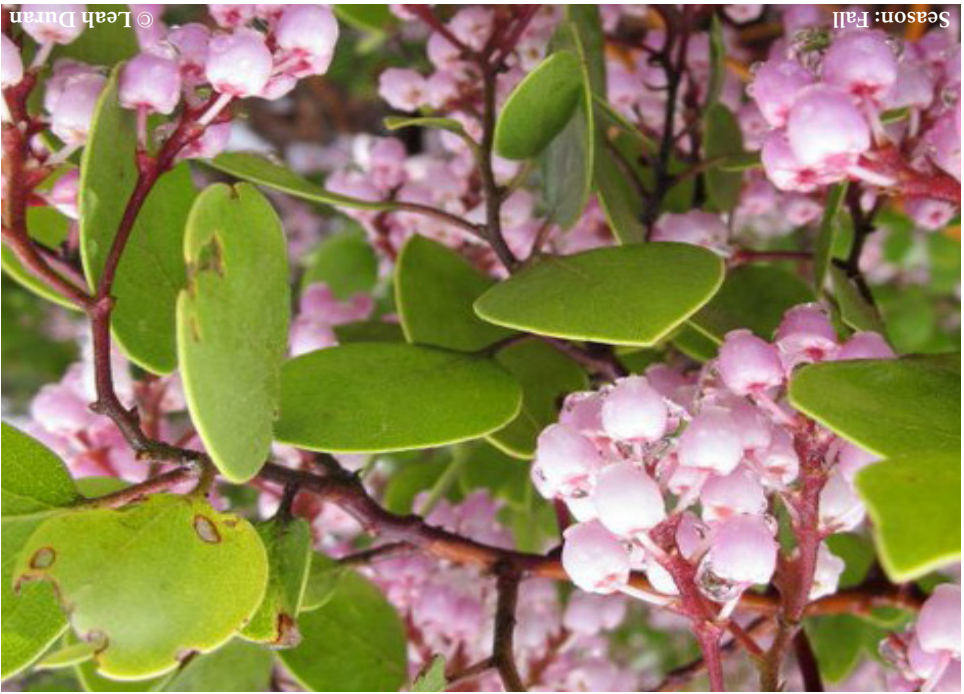
Arctostaphylos manzanita

Heath Family

Manzanita's peeling, reddish-brown bark can be mistaken for madrone, a fellow member of the heath family. Bell-like flowers hang in clusters and change color from white to red as the summer progresses.

Ethnobotanic Uses:

The name manzanita, or “little apple” in Spanish, refers to the plant's fruits, which were gathered in summer, ground on a metate, and eaten in winter. American Indians created a drink made from manzanita branch tips and fruits. They smoked dried fish over a manzanita wood fire and boiled berries to treat poison oak rash .



Season: Fall

© Leah Duran

COMMON MANZANITA



© Keir Morse

BLUE OAK



© Neal Kramer

CALIFORNIA SAGEBRUSH



© Neal Kramer

CALIFORNIA WOOD FERN

MUGWORT

May – October

Artemisia douglasiana

Sunflower Family

On sunny days, mugwort turns its leaves upside-down to reflect light and help retain moisture. Look for this 6-foot tall plant in riparian areas.

Ethnobotanic Uses:

Mugwort was used in a cauterizing method for wounds, skin lesions and rheumatism. Similar uses in Asian medicine date back to ancient times. Leaves lined baby cradles and were applied as a plaster for sore muscles. Mugwort also played a role in puberty rituals.

HEART-LEAFED MILKWEED

March – July

Asclepias cordifolia

Milkweed Family

Cordifolia, or “heart-shaped” in Latin, references the appearance of this milkweed’s broad leaves. Many milkweeds are toxic to livestock and should be regarded with caution, though no human poisonings have been reported for this species.

Ethnobotanic Uses:

Milkweed fiber was fashioned into men’s belts, ritual dance aprons, and carrying nets for small items such as acorns. As medicine, milkweed was used for its purgative qualities.

NARROW-LEAFED MILKWEED

June – Sept.

Asclepias fascicularis

Milkweed Family

Monarch butterfly larvae feed on the narrow, green leaves of this milkweed, characterized by pale maroon flowers atop 1-to 3-foot stems.

Ethnobotanic Uses:

Milkweed stems were used to make cordage and clothing for ceremonial dances. The white juice that spurts from the stems when cut – hence the name milkweed – was made into chewing gum.

SOAP PLANT

May – August

Chlorogalum pomeridianum

Lily Family

Soap plant has a base of dark green wavy, 1-inch wide leaves. White, lily-like flowers bloom at night, and each plant can support 200 flowers or more. Fire stimulates seeding and flowering.

Ethnobotanic Uses:

American Indians crushed the bulb and mixed it with water to create suds for washing hair and clothing. This plant also provided fish poison, glue, and brushes. Some Chumash shamans used soaproot fiber to create bear costumes and then ambushed people.



© Carol V. Williams

SOAP PLANT



© Neal Kramer

NARROW-LEAFED MILKWEED



© Keir Morse

HEART-LEAFED MILKWEED



© Neal Kramer

MUGWORT

TURKEY MULLEIN

Croton setigerus

Spurge Family

Turkey mullein features furry, felt-like leaves and green flowers. Mourning doves and wild turkeys eat the seeds, hence its common names doveweed and turkey mullein.

Ethnobotanic Uses:

Mullein decoctions were used as a bath or taken internally to treat chills and fevers, including typhoid. A poultice from the leaves applied to the chest treated internal pains. Mullein also acted as a fish poison.

CALIFORNIA WOOD-SORREL February – April

Oxalis albicans

Wood-Sorrel Family

The oxalis genus contains more than 800 species – including the common shamrock – found around the world. California wood-sorrel, also called sourgrass, features five yellow petals per flower and clusters of three heart-shaped leaves attached to a slender stem.

Ethnobotanic Uses:

American Indians ate California wood-sorrel raw. Sorrel comes from the German word for sour.

ANNUAL FIREWEED

June – October

Epilobium brachycarpum

Evening Primrose Family

Also known as tall annual willowherb, annual fireweed displays purple-pink flowers. Its four petals, lined with dark veins, are so deeply notched that they appear as pairs.

Ethnobotanic Uses:

The Okanagan-Colville of Washington and British Columbia infused plant tops in water to create a hair conditioner for dandruff and general manageability.

CALIFORNIA FLANNELBUSH

May – June

Fremontodendron californicum

Sterculia Family

California flannelbush is named for explorer and California senator John C. Fremont. Adapted to rocky soil and low rainfall, this shrub displays hairy leaves and yellow flowers.

Ethnobotanic Uses:

The Kawaiisu used an infusion of the inner bark as medicine. Bark was cut on one end, peeled, washed and rubbed together to form cordage for pack straps, to bundle firewood, and to tie rafts. The wood was also used in making baby cradles and storage bins for acorns. The Sierra Miwok made hoops from bark wrapped in buckskin for the hoop and pole game.



© Neal Kramer

ANNUAL FIREWEED



© Barry Breckling

CALIFORNIA FLANNELBUSH



© Robert A. Hamilton

TURKEY MULLEIN



© Bob Huettmann

CALIFORNIA WOOD-SORREL

COMMON GUM PLANT

August – October

Grindelia camporum var. camporum

Sunflower Family

Gum plant's name comes from a resinous substance covering the plant.

Ethnobotanic Uses:

Gum plant was made into a salve and sold in drugstores. Fresh plant material was applied or used in the form of a decoction or alcohol infusion to treat poison oak rash, skin diseases, and pulmonary troubles.

ARROYO LUPINE

February – May

Lupinus succulentus

Pea Family

A yellow center graces each uppermost petal of Arroyo lupine's purple-blue flowers. After these fragrant flowers fade, look for its dark green, palm-shaped leaves.

Ethnobotanic Uses:

The Kashaya and Pomo used lupine flowers in wreaths for the Flower Dance, performed at the Strawberry Festival in May.

STICKY TARWEED

March – November

Holocarpha heermannii

Sunflower Family

The Spanish name for tarweed is escoba, or “broom,” as tarweed was used to create brooms.

Ethnobotanic Uses:

Several varieties of tarweed exist. California peoples made a pinole from tarweed seeds that was consumed dry or with added water. In times of famine, the entire plant was boiled down to a gum and eaten.

CALIFORNIA BLACK WALNUT

March – Aug.

Juglans californica var. hindsii

Walnut Family

This tree provides cover for deer, nesting places for owls, and food for squirrels. Walnuts are threatened by development, overgrazing, and increased recreational use.

Ethnobotanic Uses:

The Chumash ate walnuts and used the bark for making baskets. Walnut shells were split in half and filled with tar to form dice, used in a gambling game where the stakes included political office.



© Robert A. Hamilton

CALIFORNIA BLACK WALNUT



© Christopher L. Christie

STICKY TARWEED



© Steve Matson

ARROYO LUPINE



© Keir Morse

COMMON GUM PLANT

HOARY NETTLE STINGING NETTLE

June – September

Urtica dioica ssp. holosericea

Nettle Family

Nettle's genus name comes from the Latin "urere" meaning "to burn," a reference to the hairs on its leaves and stem that release stinging chemicals when touched.

Ethnobotanic Uses:

Whipping with fresh nettles treated paralysis and rheumatism. Dried nettle stems provided cordage that was fashioned into canoe lashings and fishing lines and nets. Nettle threads were also used to sew feathers to dancing aprons.

OREGON WHITE OAK

April – May

Quercus garryana

Oak Family

Thick, furrowed bark and lobed, 6-inch leaves characterize this deciduous oak. Oregon white oak, which sometimes grows as a shrub in high-elevation areas, can reach up to 100 feet tall.

Ethnobotanic Uses:

The Cowlitz used bark decoctions for tuberculosis, while Karok mothers drank an infusion before the birth of their first baby. The acorns were roasted and eaten or used as flour for bread, pancakes and soup. Acorn meal also acted as glue to mend cracks in clay pots. The Kawaiisu used the top of acorns as a children's toy.

BLACK SAGE

March – July

Salvia mellifera

Mint Family

Black sage is sensitive to pollution and serves as a biological indicator of air quality.

Ethnobotanic Uses:

The Ohlone used black sage leaves to treat coughs, sore throats, earaches and limb paralysis. Crushed leaves and stems were used to flavor food, while seeds were parched and ground into a meal.

COAST LIVE OAK

February – April

Quercus agrifolia

Oak Family

The Chumash preferred acorns of this evergreen oak over those of other species for food. Its dried acorns consist of 4.4% protein, 20.4% fat and 52.7% carbohydrate, and one tree can produce several hundred pounds of acorns yearly.

Ethnobotanic Uses:

Coast live oak bark was favored as firewood for its long-lasting coals. A burning oak coal was used to trim bangs. Juice from oak galls was applied to wounds, while bark was chewed to promote strong teeth. The Chumash used oak wood to make boxes, baby cradles, and materials for the hoop and pole game.



BLACK SAGE

© Lynn Watson, Santa Barbara

© Steve Matson



OREGON WHITE OAK



HOARY NETTLE, STINGING NETTLE

© Kell Morse

© Neal Kramer

John Muir National Historic Site

National Park Service

U.S. Department of the Interior



MT. WANDA ETHNOBOTANY CARDS

These flashcards are intended for the layperson interested in ethnobotany, the scientific study of the relationship between people and plants.

We hope these flashcards will help foster an appreciation for California Native People's knowledge and uses of plants, as well as their intimate relationship to the environments in which they lived. These cards feature native plants commonly found on Mt. Wanda.

Information comes from many sources, including:

Timbrook, Janice. Chumash Ethnobotany: *Plant Knowledge among the Chumash People of Southern California*. Santa Barbara, CA: Santa Barbara Museum of Natural History, 2007. Print.

WARNING:

These flashcards are not intended for the personal collection and/or use of wild plants.

Protect Your Health

Identifying plants incorrectly poses a danger to one's health. Use of the wrong plant – or even the right plant in the wrong way – could result in undesired effects, including death.

Protect the Park

Mt. Wanda is preserved for future generations by the National Park Service. In order to protect our natural resources, the taking of plants is strictly prohibited.